

Holistic Approach to Rehabilitation of A Leprosy Patient with Unilateral Trans Tibial Amputation- A Case Report

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I. Introduction

Even after the availability of effective treatment and management of the disease, persons affected by Leprosy and related disability, face stigmatisation.(1–3) This stigma and discrimination due to disabilities restricts social participation and activity of the individual, hampering earning capacity, having direct bearings on the socio-economic status.(4) (5) It is reported that a large segment of preventable disability and resultant debilitation is likely being missed in certain places in India. (6,7) Therefore, a holistic approach towards the treatment of leprosy that prevents debilitation and sustains rehabilitation is needed. The rehabilitation process begins as soon as the patient is diagnosed and started on MDT, with a greater emphasis on the assessment of disability at diagnosis, so that those at particular risk can be recognized and managed appropriately.(6,7) Community based rehabilitation (CBR) has been described as a strategy for leprosy rehabilitation, equalisation of opportunities, poverty reduction and social inclusion of people with disabilities. The patient is no longer a passive member but is empowered to take control of his/ her own rehabilitation with the community taking an active part in the process.

II. Case Report

Mr D was born in 1966 at Nepal. No recall of birth and initial developmental history could be elicited from him and there were no records. He moved to India in the year 1985 and worked as a manual labourer. In 1987 he moved to Himachal Pradesh, a mountainous state in North India.

In 1988 while on odd jobs he developed a non healing ulcer on the right foot. He was seen at the primary health centre and then was referred to the district hospital, where he was diagnosed with Leprosy and was started on two drug regimen for 2 years. During this period he lost sensation in the left toes. In the winter of '88 while trying to cross the treacherous Rohtang Pass, Mr D developed frost bite in the left big toe and it auto amputated. He was however fully functional after this and had no medical issues for 8 years.

In 1996 he developed a blister on his right big toe. By the time he sought medical attention the leg was cellulitic. He was put on intravenous antibiotics and a forefoot amputation was done which was later converted to Trans tibial amputation. He was again started on two drug regimen for Hansen's which lasted for 2 years. This handicap left Mr D unemployed and dejected. With no formal education and experience it was difficult for him to seek employment.

His case was taken up by the hospital where he underwent amputation. He underwent intensive physical therapy and was negotiate uneven terrain, climb stairs with his prosthetic Jaipur foot. He was still unemployed and sustained himself doing odd jobs at this hospital. During the next three years he gradually developed bilateral hand deformities for which he was operated. His left hand function improved but he developed post operative infection in the right hand which healed after long term antibiotics but he developed claw deformity.

This hospital started a small school in which he started working as the janitor, a position which he still holds; this was the first time that he feels he was gainfully employed.

His current examination findings: He has right eye corneal scar which he got in an unrelated accident. The right hand is complete claw. All fingers are intact but there is marked wasting in all the muscle groups. He is able to modify the right hand for gross holding but can hold a pen to write his name with modification. Left hand has scars of capsulodesis but has partly lost correction in the lateral 3 fingers. The amputated right Trans tibial stump had an ulcer due to the current worn out prosthesis which is now epithelialising. All peripheral nerves thickened. He has glove and stocking sensation deficits with almost 50% decrease in sensation.

III. Discussion

Manali is a picturesque town located in Himachal Pradesh in the Northern part of India. The terrain poses a challenge to negotiate, especially in the winter months with snowfall as high as 4 feet. Being a tourist destination, workers from Nepal and other states migrate here in search of labour. Majority of manual and

unskilled workers in this area are made up of this population. This population has health issues of their own with limited access to the health care.

Holistic rehabilitation in leprosy not only has medical but also a socio- economic component that emphasises on vocational training or a small loan that may help the patient to achieve a new start. (8) Mr D is an example of sustained, holistic rehabilitation that took place over two decades. His situation was worsened by the fact that he was a migrant with no support system. He probably migrated after contracting the disease; he was identified early and treated early. Though a series of unfortunate instances led to him becoming a below knee amputee and having hand deformities, a timely intervention by his treating doctors and sponsorship of the institution for prosthesis and for hand surgery improved his working capacity. Mr D has gone through 6 prosthesis and his colleagues at the school, where he works, are currently contributing to get him the latest prosthesis.

The rehabilitation process did not end there, the acceptance of such a person into the community to the extent of getting him married, and providing him vocation to sustain his existence with dignity are things of lifetime. The return of his confidence and self dignity is evident by the fact that he is forever willing to narrate his story to any amputee patients, encouraging them. The institution's effort in this life success is commendable, even more so is the fighting spirit and Mr. D's will to take control of his own life and live with dignity.

This case provides a key lesson that even in a resource limited set up, through inclusive rehabilitation and community participation, the quality of life of leprosy patients with severe disabilities can be significantly improved.

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